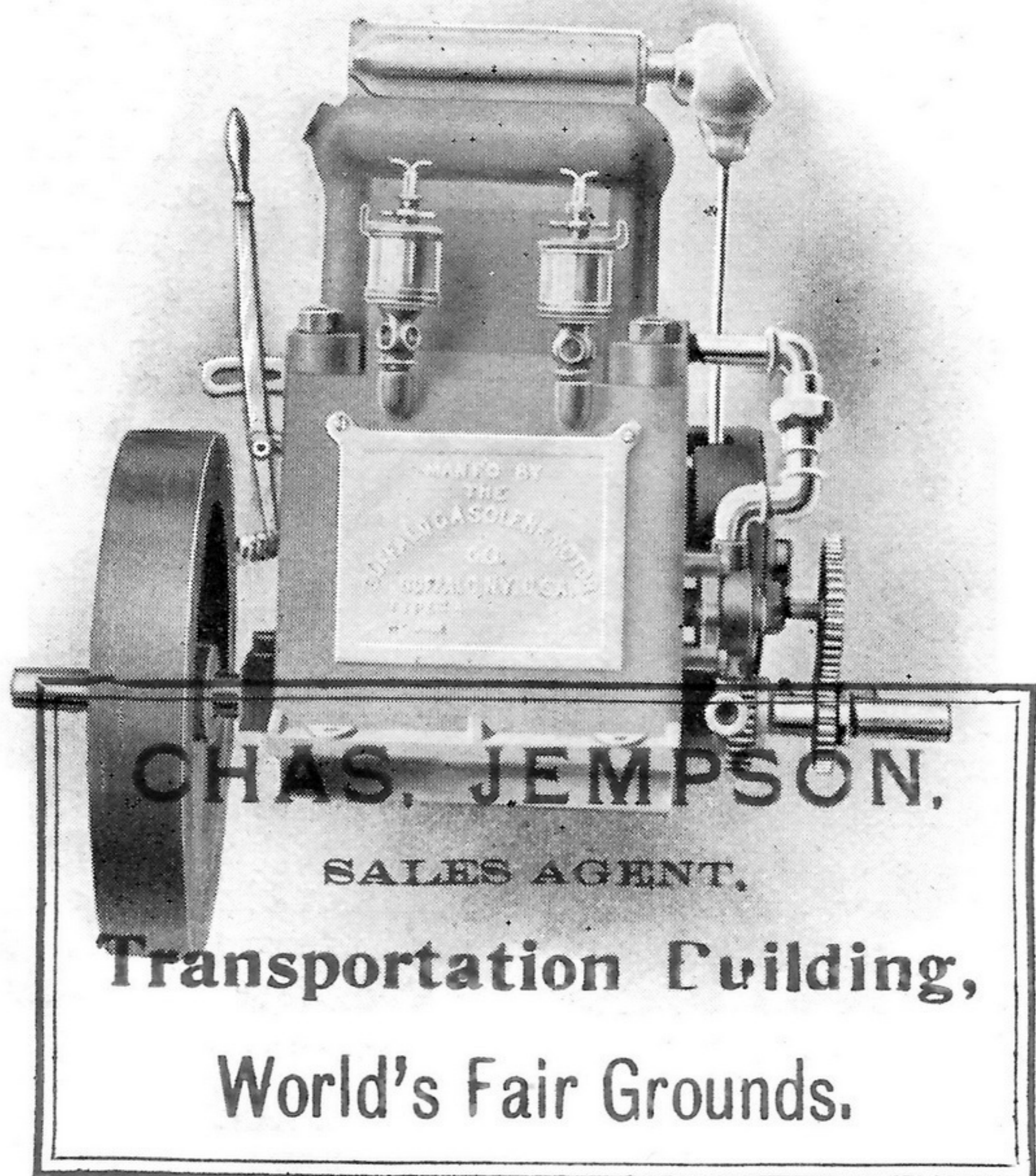


# THE "BUFFALO" MARINE MOTORS



*MANUFACTURED ONLY BY*  
**BUFFALO GASOLENE  
MOTOR COMPANY**

1280-1286 NIAGARA STREET, - BUFFALO, N. Y.

## A BRIEF DESCRIPTION

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OUR motors contain solid, one piece steel forged crank shafts, and mechanically operated inlet valves, assuring a regular supply, which, in turn, gives a steady measured impulse, and guaranteed regular speed and absolutely reliable. No troublesome cranking motor which will not start because inlet valves are stuck to seats. We equip all our motors with metal enclosed bases, with sufficiently large detachable panels, so that access to all parts is easy. We use solid steel forged valves, accurately ground to a good seat. There are five heavy bearings in base of motor, assuring firm journals for crank shaft. These bearing caps are held in proper place by double lock nuts and split keys, consequently there will be no trouble of lost nuts and loose bearings. Motors are completely water-jacketed, including head and valves. There is no packing on our motor excepting on the water jacket plate, and with this there is no trouble, as there is no pressure to blow it out. The sparker plugs on top of motors have a double seated ground joint, absolutely compression tight. The cams, which are steel forged, operating inlet and outlet valves are all on one shaft; being pinned on the shaft assures opening the valve at absolutely the right time. Just above the valves, in centre, are valve plugs. Should any valve leak, it can be taken out immediately, reground and replaced, and ready to run in very short time. All the four cylinders are fed with a carburettor through one inlet casting.

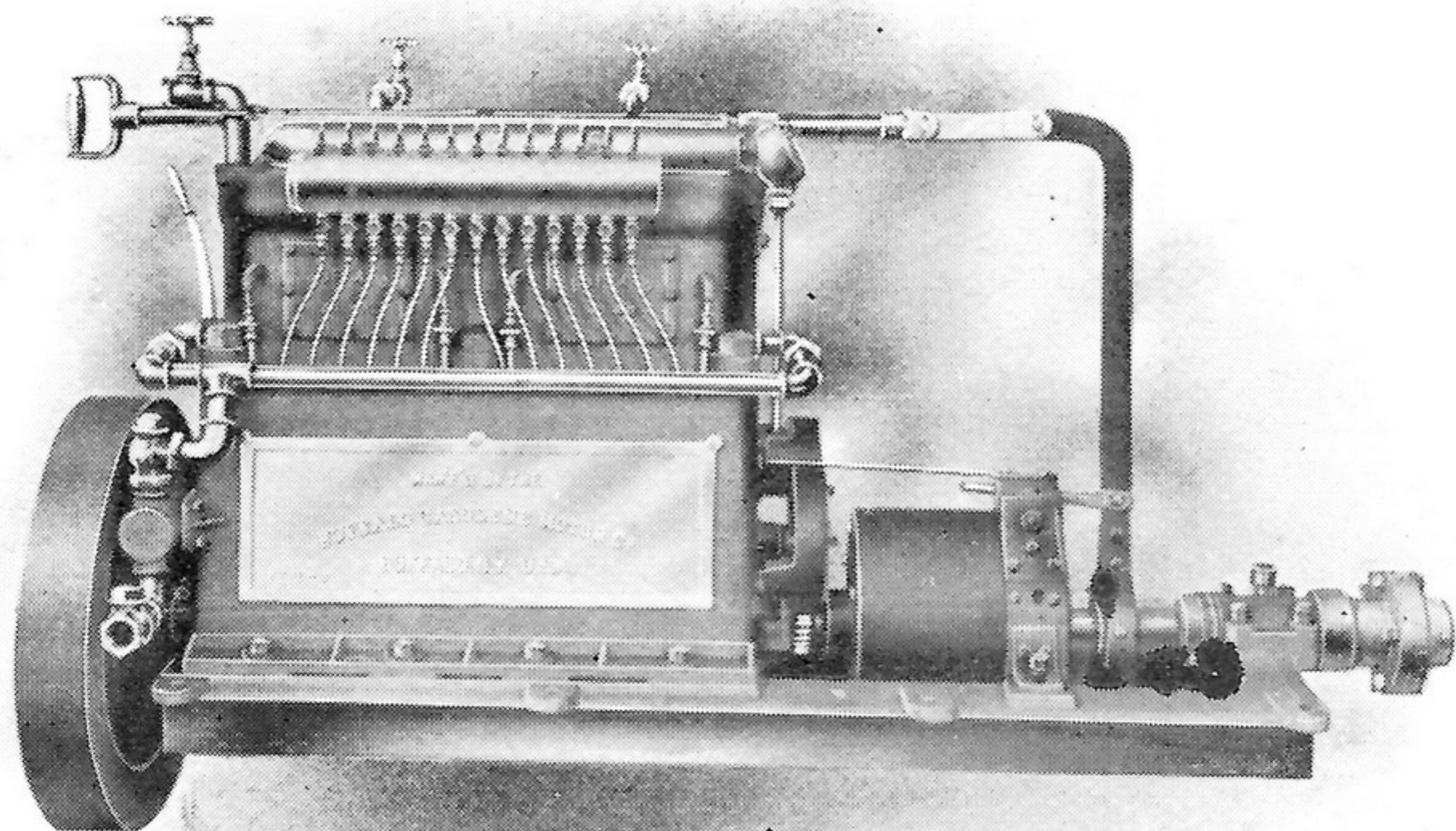
Connecting rods are steel forgings with bronze bearing caps, sufficiently heavy to withstand the load they are subjected to. We give particular attention in regard to giving pistons and piston rings a fit, which, after being turned, are split, turned and ground to proper size. This insures a perfect compression and absolutely true circle. Our motors are equipped with the Make and Break or Jump Spark to suit the purchaser.

For the season of 1904 we are furnishing with all our motors a float-feed carburettor of the latest and most improved design and construction, which is attached directly to the motor, and contains a throttle for gauging the amount of gasified vapor admitted to the cylinders. There is also attached to this, a lever of neat design, located near the sparker lever, so that the sparking and throttling is conveniently and easily operated.

We manufacture the following sizes—2, 5, 7½, 10, 15, 20, 25, 40 H. P.

# Four-Cylinder, 20 H. P. Balanced Motor

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Bore, 5 inches; stroke, 6 inches; weight, 960 pounds, without reverse gear; weight, 1425 pounds, with bed and reverse gear; diameter of fly wheel, 22 inches; diameter of shaft, 2 inches.

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Height center of crank up,  $25\frac{7}{8}$  inches.

Center of crank down,  $6\frac{1}{2}$  inches.

Width of space between foundation blocks,  $12\frac{1}{2}$  inches.

Width of base over all,  $16\frac{1}{2}$  inches.

Length over all,  $31\frac{7}{8}$  inches, with 8 inches of shaft on each end.

Length of foundation,  $27\frac{3}{4}$  inches.

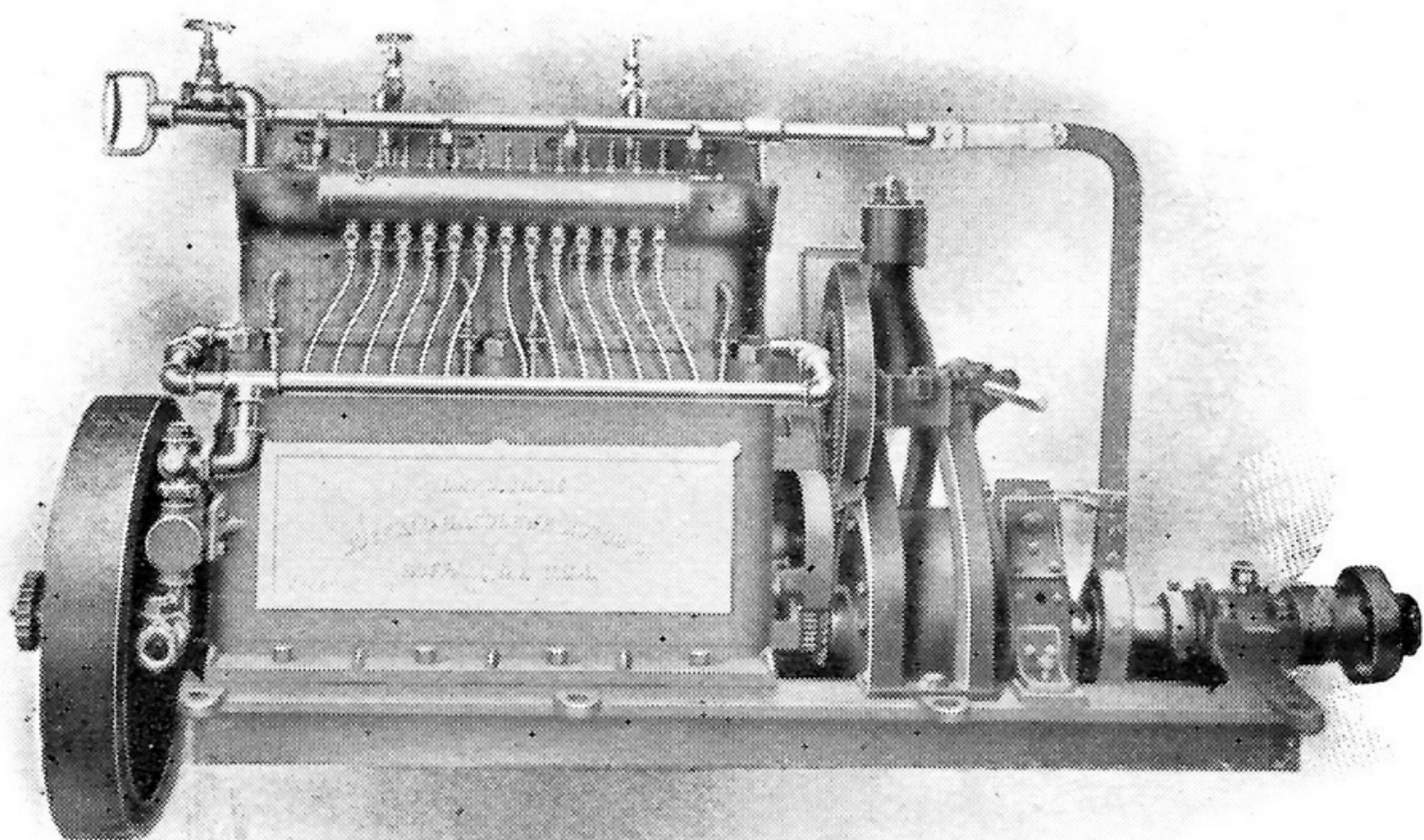
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**SPEED:** Changed instantly at will of operator { 500 Normal  
100 Minimum  
800 Maximum

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*CATALOGUE AND PRICES SENT ON APPLICATION.*

# Four-Cylinder, 40 H. P. Balanced Motor



## GUARANTEE

**WE GUARANTEE** the “Buffalo” engine to run steadily and satisfactorily under all conditions of weather, when properly installed and ordinary intelligent care and attention is given to same. We also guarantee our engines for one year against any imperfections in workmanship or material, and any defective parts will be replaced if returned to factory, express or freight prepaid. This does not apply to instances where repairs are necessary because of abuse, misuse or neglect. We also guarantee rated H. P., as listed in our catalogues.